

CZ/13-60-1-12/26

Lithium Ceramic - Ceramic Materials With a Negative Thermal Coefficient of Expansion

There are: 4 diagrams, 2 tables and 114 references, 13 of which are Soviet, 21 German, 9 Czech, 2 Polish, 1 Hungarian, 63 English or American, 1 Swiss, 1 French, 1 Japanese, 1 Finnish and 1 Dutch.

ASSOCIATION: Výzkumný ústav elektrotechnické keramiky, Hradec Králové (Research Institute of Electro-Technical Ceramics, Hradec Králové)

Card 2/2

TUREK, M.

Economy in cutting shops for plate glass, p. 34, SKLAR A KERAMIK  
(Ministerstvo lehkeho prumyslu) Praha, Vol. 4, No. 2, Feb. 1954

SOURCE: East European Accessions List (EEAL) Library of Congress,  
Vol. 4, No. 12, December 1956

TUREK, M.

TUREK, M. A contribution to the analysis of silicates. p. 317

Vol. 34, no. 9, Sept. 1956

STAVIVO  
TECHNOLOGY  
Praha, Czechoslovakia

So: East European Accession Vol. 6, no. 2, 1957

"APPROVED FOR RELEASE: 03/14/2001

CIA-RDP86-00513R001757520009-5

APPROVED FOR RELEASE: 03/14/2001

CIA-RDP86-00513R001757520009-5"

TURSK, M.

Analysis of aluminum oxide. p. 157.  
SKLAR A KERAMIK, Praha, Vol. 5, no. 7, July 1955.

SO: Monthly List of East European Accessions, (EEAL), LC, Vol. 4, no. 10, Oct. 1955,  
Uncl.

TUREK, Otakar, inz.

Let us prepare in every field for the improvement of the national  
economy management system. Podn org 18 no.8:337-340 Ag '64.

TUREK, Otokar

International comparison of national income distribution. Stat  
szemle 40 no.4:398-407 Ap '62.

1. A Csehszlovak Szocialista Koztarsasag Allami Tervbizottsaganak  
csoportvezetöje.

TUREK, R.

"Remarks on the anthropogeography of ancient Czech tribes", P. 31.,  
(SEORNÍK, Vol. 59, No. 1, 1954, Praha, Czechoslovakia)

SO: Monthly List of East European Accessions, (EEAL), LC, Vol. 4,  
No. 6, June 1955, Uncl.

TUREK, Rudolf, dr.; BREN, Jiri, dr.

Archaeology from airplanes. Letecky obzor 5 no.12:396-397 D '61.

(Archaeology) (Aeroplanes)

"APPROVED FOR RELEASE: 03/14/2001

CIA-RDP86-00513R001757520009-5

TURK, S.

Sixty years of Prof. Feliks Kmitkowski's scientific work.  
Przegl geol 11 no. 8:407-408 Ag '63.

APPROVED FOR RELEASE: 03/14/2001

CIA-RDP86-00513R001757520009-5"

TUREK, S.

Influence of ultracentrifugation of blood serums on the polarographic reaction of their deproteinated solutions.  
S. Turek and B. Čížinský (Charles Univ., Prague). *Cesko-slov. Onkologiu* 2, 335-50 (1955); cf. R. Brdička, *Research* 1, 25 (1947).—Ultracentrifugation (I) of blood serum at 120,000 r.p.m. (field 160,000 g) enables a more quant. registration of the polarographically active serum constituents of lower mol. wt. Use of I marks a new method of polarographic examin. of serums eliminating considerably the possibilities of the results being influenced by prep. procedures. I of native blood serums does not cause uncovering of polarographically active groups of protein macromols., however, it influences, especially in some pathol. cases, the results of colloid and serological reactions of the serum. Mechanism is discussed of the effects of I in combination with terminal sulfosalicylic acid and alk. denaturation of proteins. L. J. Urbánek

(1)

TUREK, S.; BAZYNISKI, J.; MALINOWSKI, J.

"Aims of Hydrogeology in Poland." p.14  
(PRZEGLAD GEOLOGICZNY No. 1/2, Jan./Feb. 1954 Warszawa, Poland)

SO: Monthly List of East European Accessions, LC, Vol. 3, no. 5, May 1954/Uncl.

TUREK, S.

The problem of coprecipitation of soluble proteins of blood serum  
in protein elimination. Coll Cz Chem 25 no.5:1520-1524 My '60.

1. Institut fur Hygiene, Fakultat fur Kinderheilkunde, Karlsuniver-  
sitat, Prag.

TUREK, Stanislaw

The character of the waters of the Miocene formations of the  
sunken foreland of the Carpathian Mountains. Kwartalnik geol  
6 no.2:421-422 '62.

1. Zaklad Hydrogeologii, Instytut Geologiczny, Warszawa.

TUREK, S.; PIHRT, J.

Ketosis after tonsillectomy in children of school age and its prevention. Cesk. pediat. 17 no.12:1077-1080 D '62.

1. Katedra preventivni pediatrie fakulty detskeho lekarstvi University Karlovy v Praze, vedouci prof. dr. K. Kubat a katedra otorinolaryngologie lekarske fakulty hygienicke University Karlovy v Praze, vedouci prof. dr. V. Hlavacek.

(TONSILLECTOMY)

(ACIDOSIS)

TUREK, Stanislaw

Hydrogeological problems of the phosphorite deposits in the  
Annopol-Radom region and the Burzenin region. Kwartalnik geol  
5 no.4:976-977 '61.

1. Zaklad Hydrogeologii, Instytut Geologiczny, Warszawa.

TUREK, S.; CIZINSKY, B.

Effect of ultracentrifugation of the blood serum on  
Brdlicka's filtrate polarographic reaction; ultracentrifugate  
polarographic reaction. Cesk. onkol. 2 no.4:335-356 1955.

1. Fakultni nemocnice v Praze XII, Lekarska fakulta hygienicka  
KU v Praze.

(BLOOD PROTEINS, determination,  
ultracentrifugation polarographic reaction. (Cz))

(CENTRIFUGATION,  
ultracentrifugation polarographic reaction of blood  
proteins. (Cz))

(POLAROGRAPHY,  
of blood proteins, ultracentrifugation polarographic  
reaction. (Cz))

TUREK, Stanislav

2

*✓* Stable, coordinated, organic, iron compounds. Stanislav  
Turek, Czech. 84,311, May 1, 1958. To a soln. of 1.25 g.  
nicotinic acid amide in 100 ml. abs. EtOH there was added  
3.8 g. L-cysteine-HCl and 1.20 g. dry iron chloride under stir-  
ring. The resulting yellow ppt. was decanted and dried,  
yielding the complex  $(C_8H_{10}O_2NS.HCl)_2FeCl_4.C_2H_5ON_2$ .  
slightly sol. in abs. acetone, very sol. in water.

L. J. Urbánek

TUREK, Stanislaw

POLAND

TUREK, Stanislaw

Department of Hydrogeology, Geological Institute  
(Zaklad Hydrogeologii Instytutu Geologicznego)

Warsaw, Kwartalnik Geologiczny, No 3, 1963, p 513.

"Problems of Observing in Water at the Area of Pre-  
Carpathian Slides (East of Krakow)".

TUREK, TOMAS, MUDr

TUREK, Tomas, MUDr

Development of indications for cesarean section at the obstetrical department of a district hospital. Cesk. gyn. 19 no.4:251-255 July 54.

1. Z gyn.por. odd: OUNZ Kladno; primar MUDr Vaclav Chmelik.  
(CESAREAN SECTION  
indic., develop. at district hosp. in Czech.)

TUREK, V.

Present-day development of equipment for sugar-cane mills with special regard to  
that manufactured in Czechoslovakia. p. 32.

CZECHOSLOVAK HEAVY INDUSTRY. Prague, Czechoslovakia. No. 8, 1959.

Monthly list of East European Accessions (EEAI) LC, Vol. 9, no. 2, Feb. 1960.

Uncl.

ACC NR: AP6032840

(A)

SOURCE CODE: CZ/0078/66/000/007/0026/0026

INVENTOR: Turek, Vaclav (Graduate technician; Bast)

ORG: none

TITLE: Control device for doors of aerial cameras. CZ Pat. No. PV 1450-65

SOURCE: Vynalezy, no. 7, 1966, 26

TOPIC TAGS: aerial photography, photography, camera, CAMERA COMPONENT

ABSTRACT: A device for controlling the doors of aerial photographic cameras is introduced. The doors have an aerodynamic shape conforming to the shape of the cover lens of the camera, and are mounted on guide rails. The doors are connected with a centrally controlled electric motor. To control the displacement of the doors, switches are mounted in the terminal positions.

SUB CODE: 14/ SUBM DATE: 03Mar65/

Card 1/1

POSPISIL, M.; TUREK, V.

Thermal serum turbidity reaction. Lek. listy, Brno 8 no.20:463-466  
(CIML 25:4)  
15 Oct 1953.

l. Of the Institute of General and Experimental Pathology (Head--V.  
Uher, M.D.) of Masaryk University, Brno.

TUREK, W.

How I have managed to mow my meadow four times a year. p. 13. (PLON. Vol. 4, no. 11,  
Nov. 1953)

SO: Monthly List of East European Accessions, L.C., Vol. 3 No. 4, April, 1954

CIEŚLINSKA, Krystyna; TUREK, Zbigniew

A case of simple enuresis caused by psychogenic factors. Neurol  
neurochir psych. 12 no. 1:139-140 Ja-F '62.

1. I.Klinika Chorob Wewnętrznych, Pomorska Akademia Medyczna, Szczecin  
Kierownik: prof. dr med. F. Bolechowski; i Klinika Psychiatryczna,  
Pomorska Akademia Medyczna, Szczecin, kierownik: prof. dr F. Piatkowski.

STROJIRENÍ (Machinery)  
Vol 8, Nr 2, 21. February, 1953

Distr: 453d

Lurek Z. Výroba F. cutting properties  
of Czechoslovak and foreign cement materials

Strojírení 1953, 8, 2, p. 114  
The author has determined the cutting properties of  
the cutter heads of the cutting machines with  
cement plates (cemented carbide) and also  
those of uncoated carbide. The necessary data were  
taken at the plant "Aeroflot" in Moscow. The results  
show that the cutting properties of the  
cemented carbide tools are considerably higher  
than those of the uncoated carbide tools. The  
cutting speed even at the same feed rate is  
higher than that of the uncoated carbide.

CHMIEL, Franciszek, inz.; HARASYMCZUK, Jozef, inz.; WIECZOREK, Jerzy, inz.;  
TUREK, Zenon, inz.

Increasing the power of a TK-50 power unit by 10 MW. Gosp paliw 11  
Special issue no.(95):58 Ja '63.

1.Elektrownia Konin.

CHMIEL, Franciszek, inz.; HARASIMCZUK, Jozef, inz.; WIECZOREK, Jerzy, inz.  
TUREK, Zenon, inz.

Increasing the power of a TK-50 power unit by 10 MW.  
Gosp paliw ll Special issue no.(95):58 Ja '63.

1. Elektrownia Konin.

TURK-WANDZILAK, Zofia

Therapeutic value of heat in Heine-Medin diseases. Pediat.polska  
30 no.8:675-679 Aug '55.

1. Z Odozialu H 14 Woj.Szpitala Specj. w Krakowie. Ordynator:  
dr med. E. Juza, Krakow, ul.sw.Jana 9.  
(POLIOMYELITIS, therapy,  
heat ther.)  
(HEAT, therapeutic use,  
polio)

"APPROVED FOR RELEASE: 03/14/2001

CIA-RDP86-00513R001757520009-5

TURBEV, I. B.  
I. S. KHAJKIN, Russ. 55, '34, Oct. 31, 1939

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CIA-RDP86-00513R001757520009-5"

15-57-10-14952D

Translation from: Referativnyy zhurnal, Geologiya, 1957, Nr 10,  
p 271 (USSR)

AUTHOR: Turenko, A. N.

TITLE: Investigation of the Work Done by the Heavy Duty  
Scrapers in the Open-Pit Mining Excavations (Issledo-  
vaniye raboty bol'shegruznykh skreperov na otkrytykh  
gornykh razrabotkakh)

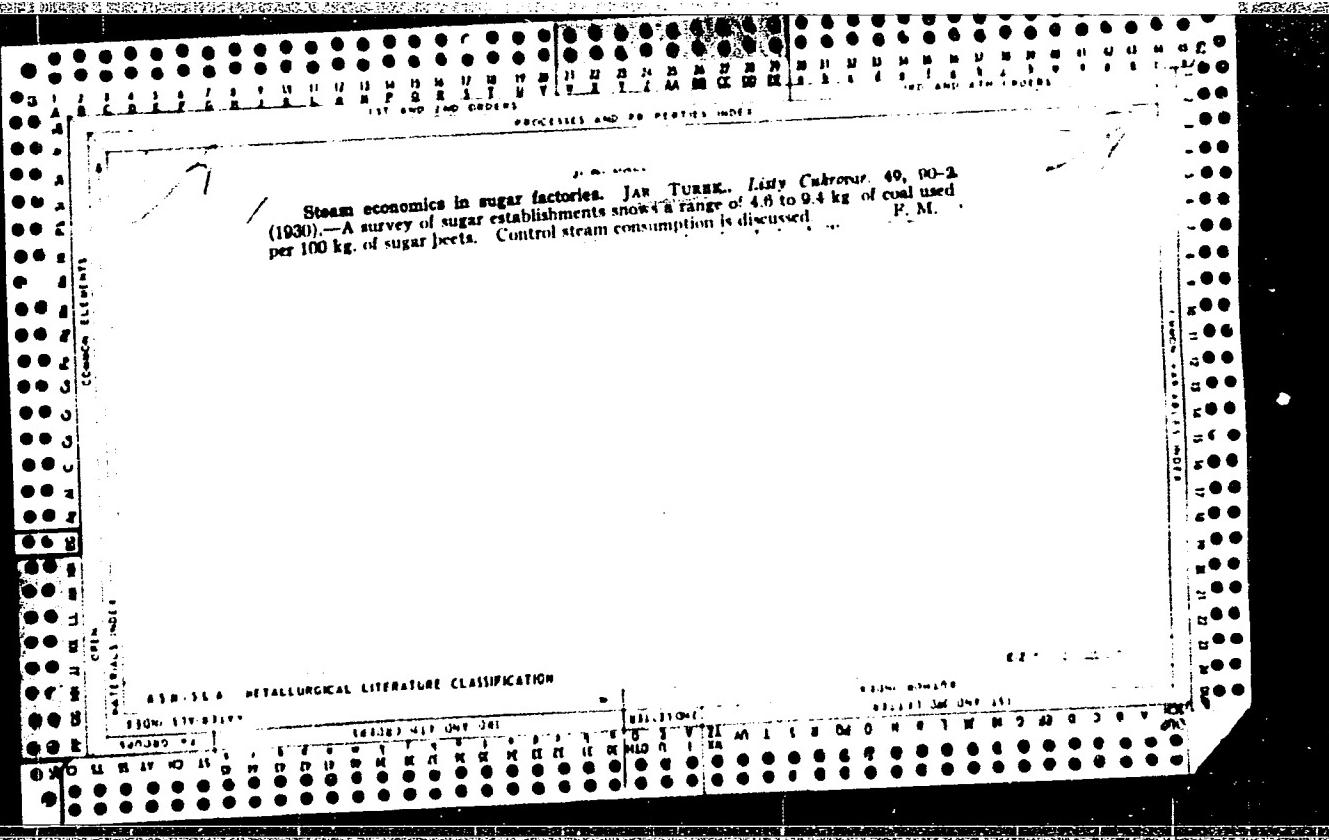
ABSTRACT: Bibliographic entry on the author's dissertation for  
the degree of Candidate of Technical Sciences,  
presented to Kiyevsk. politekhn. in-t (Kiyev Polytechnic  
Institute), Kiyev, 1957.

ASSOCIATION: Kiyevsk. politekhn. in-t (Kiyev Polytechnic Institute)

Card 1/1

PTA

1734  
1734  
*Turk A. Emulation Among Individual Branches in Building Trades  
in Order to Achieve an Increase in the Monthly Output.*  
331 878 69  
Branche wypalawodnielwo pracy w budownictwie o zwiększeniu  
produktu miesięcznego". Przegląd Budowlany No 3, 1951, pp.  
115-118  
Differences occurring between the work emulation in the building trades  
and in other industries. The necessity of finding an index by  
which to determine the extent of physical effort or of ingeniousness  
in individual sectors of the building trades. Table to ascertain the  
size of monthly average output per worker for the individual sec-  
tors of the building trades, and method of using it. Summarising the  
monthly results of the emulation drive.



CZECHOSLOVAKIA / Chemical Technology. Chemical Products and Their Application. Ceramics. Glass. Binding Materials. Concrete. - Ceramics. H-13b

Abs Jour: Ref Zhur-Khimiya, No 23, 1956, 78406.

Author : Turek, Miroslav., Bednář, Stanislav.

Inst : Not given.

Title : Thermochanical Processes in Combustion. Calculation of Maximum Theoretical Temperature of Flame.

Orig Pub: Sklar a keramik, 1957, 7, No 8, 233-234.

Abstract: The following is presented: an example of calculation of the temperature of combustion of generator gas in the theoretical amount of air and in the cases of 10, 20, 30, 40, 50, and 60% of excess air or gas in relation to the theor-

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CZECHOSLOVAKIA / Chemical Technology. Chemical Prod- H-13b  
ucts and Their Application. Ceramics.  
Glass. Binding Materials. Concrete.  
- Ceramics.

Abs Jour: Ref Zhur-Khimiya, No 23, 1958, 78406.

Abstract: ical, the curves of the dependence of temperatures of combustion of coal and generator gas on the amount of the excess air, and some considerations regarding the method of combustion of fuel in kilns for firing ceramics. See the preceding report in RZhKhim, 1958, 15189. -- O. Brykin.

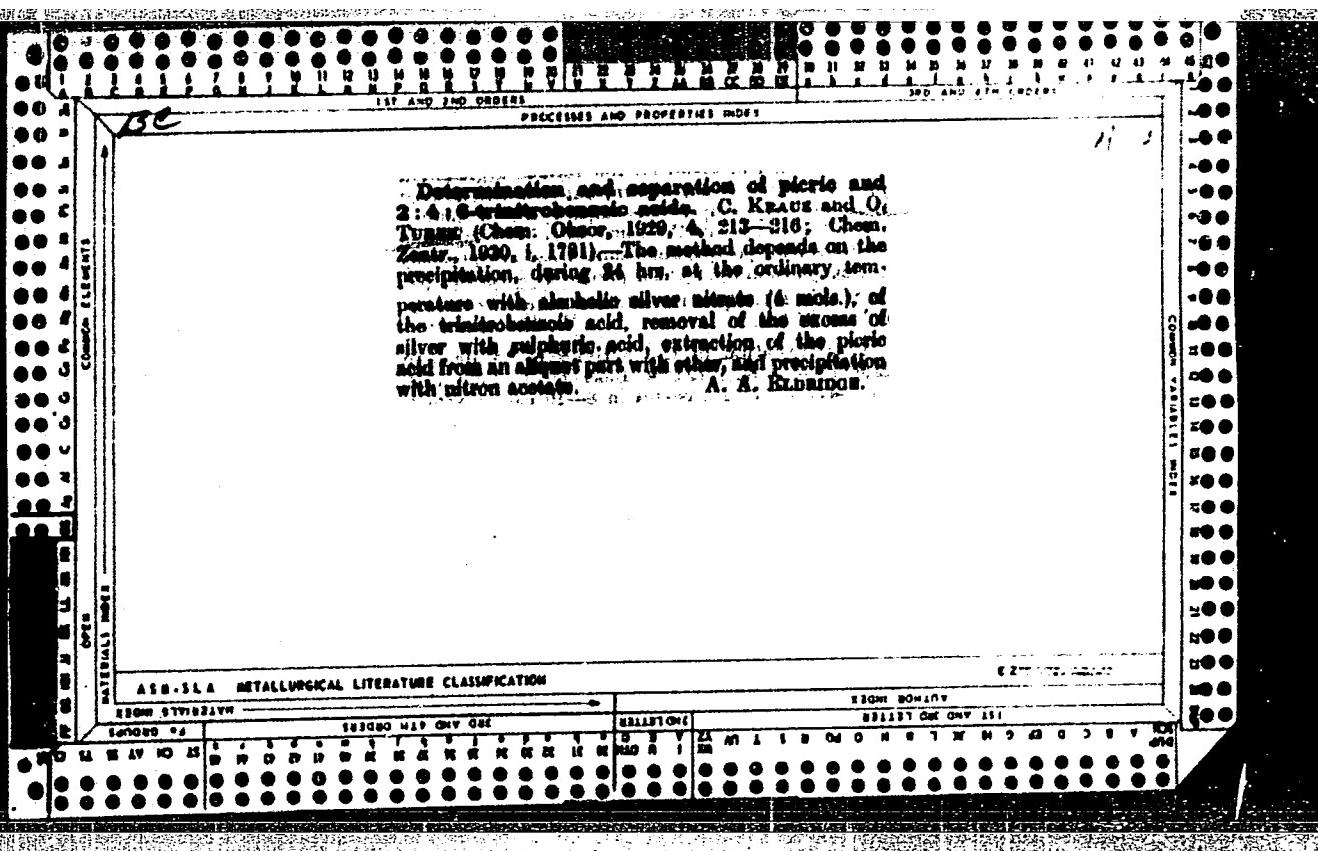
Card 2/2

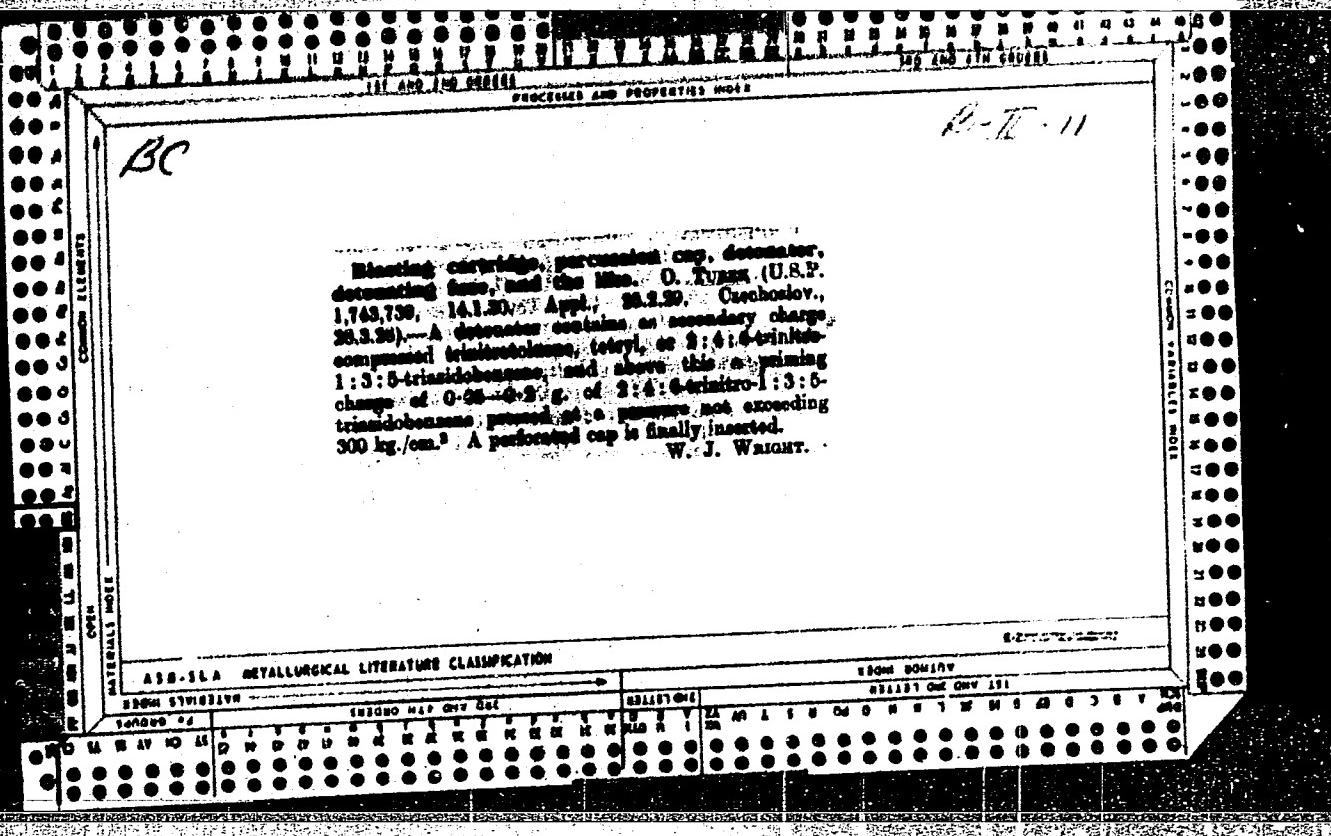
"APPROVED FOR RELEASE: 03/14/2001

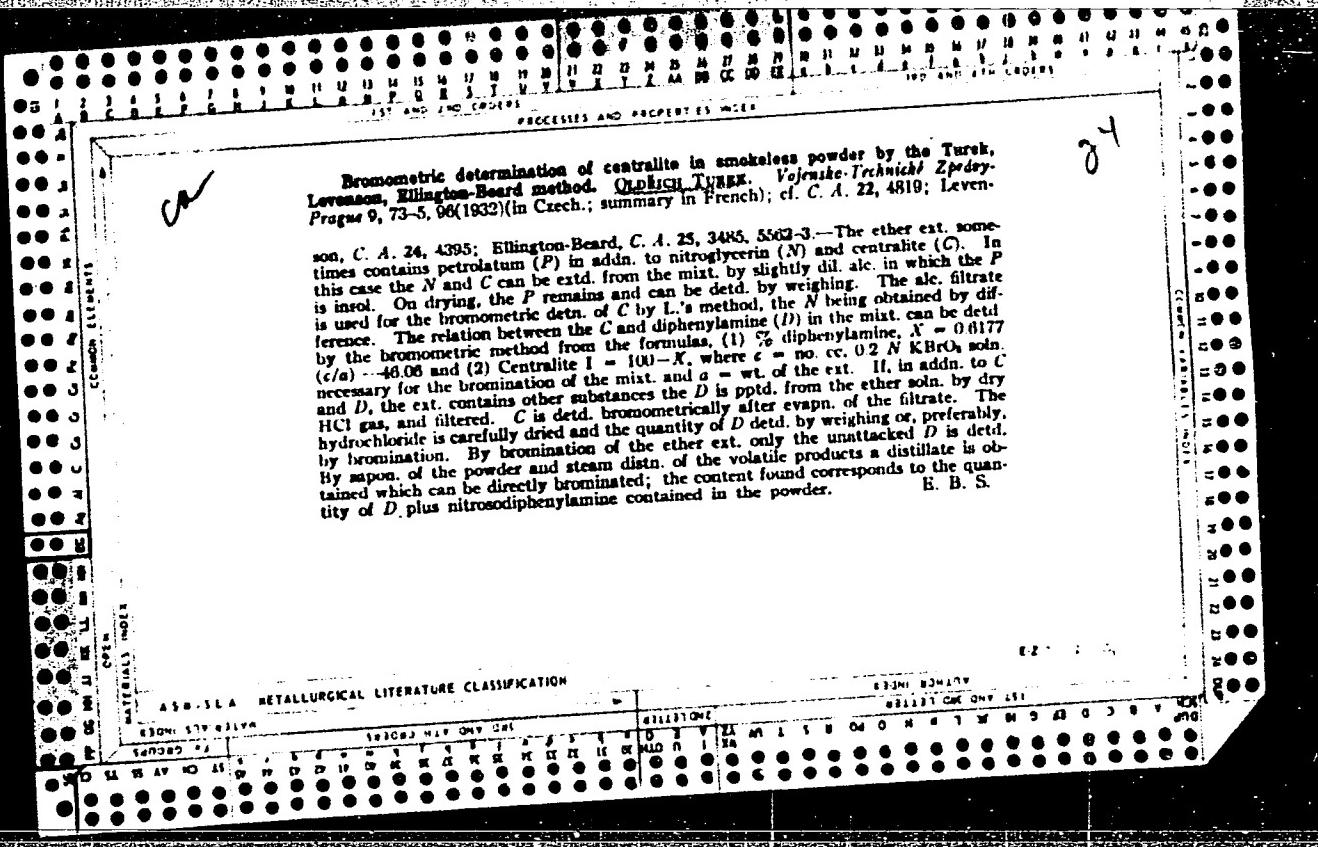
CIA-RDP86-00513R001757520009-5

APPROVED FOR RELEASE: 03/14/2001

CIA-RDP86-00513R001757520009-5"







TUREK, Z.

Experimental necrosis of the heart muscle. Cas. lek. cesk. 104  
no.23:105-114 11 Je'65.

1. Ustav patologicke fyziologie fakulty detskeho lekarstvi  
Karlov University v Praze (externi prednosta: prof. dr.  
O. Poupa, DrSc.).

24293  
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E073/E535

| 100

AUTHORS: Turek, Z., Engineer and Česánek, J.

TITLE: Application of radioisotopes in research on machining

PERIODICAL: Strojírenství, 1961, Vol.11, No.9, pp.682-688

TEXT: Detailed information is given on testing the wear of cutting tips by using radioactive tungsten. Due to its very short half-life (24.1 hours), the experiments must be carried out within the shortest possible time. However, the short half-life facilitates handling of the wastes after the tests. In the experiments, a current lathe was used which was suitably adapted and fully enclosed. A sketch of the cutting tool with the mechanically held carbide tip is shown in Fig.3. The tool geometry is as follows: rake angle  $\gamma = 10^\circ$ ; back angle  $\alpha = 5^\circ$ ; setting angle  $\kappa = 60^\circ$ ; backing off angle  $\lambda = 4^\circ$ ; tip angle  $\epsilon = 90^\circ$ , angle of lands  $\gamma_f = -5^\circ$ , land width  $f = 0.2$  mm. The radioactive carbide tip is fitted into the holder by means of a manipulator in a special jig, which is provided with a protective cover. The machined material is circular and is clamped as shown in Fig.5. The geometrical shape of the machined material is such that, on

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Application of radioisotopes ... Z/032/61/011/009/003/009  
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machining off a layer of a certain thickness, the volume of the machined off material is the same at the various diameters. All the chips and all the products of the wear of the tool are caught inside a cover surrounding the piece being machined. The process of blunting of carbide tipped tools can be subdivided into three stages: initial accelerated blunting, uniform blunting at a normal rate and final avalanche type blunting. In the experiments, a certain amount of preliminary blunting (for 8 to 15 min) was carried out so that the experiments themselves are in the range of uniform blunting. The number of pulses obtained by a scintillator depends to a large extent on the geometrical shape of the chip specimens and on the position of the scintillator. For specimens of six differing shapes, the frequency of pulses per 1 g of chips varied between 26 and 53. In the tests cylindrical specimens of 72 mm diameter, 10 mm thick, weighing 100 g were used. These were chosen due to their simplicity, easy and quick preparation and also because they provided a sufficiently large pulse frequency. Fig.10 shows the characteristic wear obtained for the Czech carbide S 1 in the machining of the steel 12 060.1 ( $v = 160$  m/min,  $s = 02$  mm/rev.

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Application of radioisotopes . . .

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E073/E535

$t = 2 \text{ mm}$ ). Curve a gives the wear at the back of the tool  $b_h \text{ mm}$  as a function of time, determined from a sequence of photographs; curve b shows the results obtained from measuring the radiation activity (total number of pulses), also as a function of time. Fig. 11 shows the rate of blunting of the same carbide tip as referred to in Fig. 10 (pulses/min vs. time, min and quantity of chips, kg). It can be seen that the method is sufficiently sensitive to give information on the rate of blunting in a much shorter time than is possible by means of an optical microscope. About 5% of the total worn off material stuck to the machined surface. Since the quantity of the tool material on the machined surface is relatively small, it can be disregarded. The dust precipitated on the walls of the cover amounted to an average of 14% of the total tool wear. Analysis of the distribution and scatter of the results for various materials led to the preliminary conclusion that during the further machining tests only the fraction which adheres to the chips will be measured. Standard type machineability tests take a long time and VÚOSO developed and tested a short-time method of testing the machineability which is

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Application of radioisotopes . . .

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based on the assumption that even the initial accelerated blunting is proportional to their final blunting. Accordingly, the machining on the lathe is carried on for a shorter time to achieve a smaller blunting and, in the same way as in current type tests, the machining speeds are compared. The machineability of a certain material is determined by reference to a comparison material, i.e. by the ratio of the machining speed of the investigated material,  $v_{60}^*$ , and the machining speed of the corresponding reference material,  $v_{60r}^*$ , to obtain the same tool life. In the case of tests with radioisotopes the same principle is applied, i.e. the coefficient of machineability is determined from the ratio of the pulses generated by the chips of the reference material to the frequency of the pulses from the chips of the test material. It is stated that the machineability coefficients determined from the pulse frequencies (average values from five measurements) are in good agreement with the respective values determined from the machining speed in short duration tests. The tests based on optically determined machineability only take into consideration the wear on the back of the tool whilst the radioisotope method

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records the total wear of the cutting tip and, in a number of cases, this method yields more objective results. There are 12 figures and 5 tables.

ASSOCIATION: VUOSO, Prague

Fig.3

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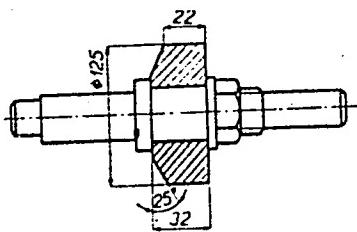
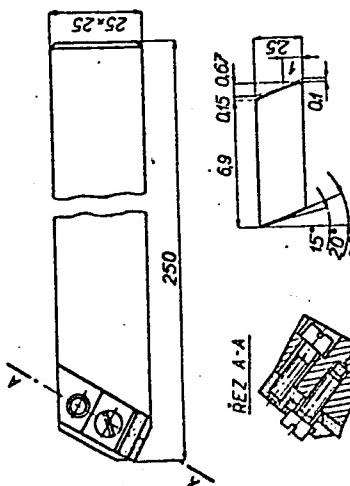


Fig.5

CIESLINSKA, Krystyna; TUREK, Zbigniew

A case of diabetes insipidus caused by psychogenic factors. Neurol.  
neurochir. Psychiat. pol. 12 no.1:139-140 '62.

1. Z I Kliniki Chorob Wewnętrznych PAM w Szczecinie Kierownik: prof. dr  
med. F. Bolechowski i z Kliniki Psychiatrycznej PAM w Szczecinie  
Kierownik: Z. Prof. dr F. Piatkowski.

(DIABETES INSIPIDUS psychol)

TUREK, Z.

Present state in the development of ceramic cutting materials.

P. 950. (STROJIRENSTVI) (Praha, Czechoslovakia) Vol. 7, no. 12, Dec. 1957

SO: Monthly Index of East European Accession (EEAI) IC Vol. 7, No. 5, 1958

TUFEK, Z.

Effect of the rough edges of sintered-carbide tools on their durability.  
p. 494

STROJIRENSTVI (Ministerstvo tezkeho strojirenstvi, Ministerstvo prameho  
strojirenstvi a Ministerstvo automobiloveho prumyslu a  
zemedeskych stucju) Vol. 6, No. 10, Oct. 1956

Praha, Czechoslovakia

SOURCE: East European List (EELL) Library of  
Congress, Vol. 6, No. 1, January 1957

TUREK, Z.

Treatment of Heine-Medin's disease in the acute stage. Przegl. lek.,  
Krakow 8 no.7:190-193 1952. (CLML 23:4)

1. Of the Department H<sub>14</sub> (Head--Eugeniusz Juzwa, M.D.) of Krakow  
Regional Specialized Hospital.

TUREK, Zbigniew

Treatment of chronic alcoholism with the aid of apomorphine. Polski  
tygod. lek. 14 no.42:1878-1880 19 Oct 59.

1. (Z Kliniki Psychiatrycznej P. A. M. w Szczecinie; kierownik:  
z-ca prof. dr F. Piatkowski)  
(APOMORPHINE, ther.) (ALCOHOLISM, ther.)

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CIA-RDP86-00513R001757520009-5

TUREKHANOV, K.A.

GMK-50 core lifter. Geofiz. razved. no.3:115-119 '61. (MIRA 17:2)

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CIA-RDP86-00513R001757520009-5"

ZHUKHOVITSKIY, A.A.; TURKEL' TAUB, N.M.; MALYASOVA, L.A.

Simultaneous chromatographic determination of the composition  
of two mixtures. Neftekhimiia 4 no.2:337-339 Mr-Apr'64  
(MIRAL7:8)

1. Vsesoyuznyy nauchno-issledovatel'skiy institut yadernoy  
geofiziki i geokhimii.

AYNSHTEYN, S.A.; ANVAYA, B.I.; TURKAL'TUB, N.F.

Use of gas-liquid chromatography for separating some inorganic  
gases. Zav. lab. 30 no.6369-911 '64 (MIRA 1798)

TUREL'TAUB, N.M.

USSR.

Diffuseness of bands in chromatographic and thermal separations.  
A. A. Zhukhovitskii, N. M. Tureltaub, E. V. Vagin, and V. P.  
Shvartsman (Dokl. Akad. Nauk SSSR, 1954, 96, 303-306).  
Mathematical. The theory of the "fuzzing" of the lines of separation  
in chromatographic and thermal diffusion separations is  
developed, showing that the basic factor responsible is longitudinal  
diffusion at high rates of flow, i.e., the fact that the rate of sorption is  
finite. Experimental confirmation of the theoretical deductions,  
and numerical values for some of the constants included in the  
equations are reported.

J.A.C. ABSTN.

TUREMURATOV, A.T.

Studying the helminth fauna of herons and gulls in the Amu Darya  
Delta. Trudy Gel'm. lab. 12:263-277 '62. (MIRA 15:7)  
(Amu Darya Delta--Parasites--Gulls)  
(Amu Darya Delta--Parasites--Heros)  
(Amu Darya Delta--Worms, Intestinal and parasitic)

USSR/Cultivated Plants - Fodders.

M

Abs Jour : Ref Zhur Biol., No 18, 1958, 82389

Author : Turemuratov, U.T.

Inst : AS. Uzbek SSR

Title : Effect of Harrowing, Disking and Plowing Over on the Yield of Seed Alfalfa in the North of Kara-Kalpakija

Orig Pub : Izv. AN UzSSR, Ser. biol., 1957, No 2, 57-63

Abstract : In the spring of 1955, a test was started on farm plantings of triennial alfalfa (A) to find an effective method of growing it for seeds under the conditions of the central and northern regions of Kara-Kalpakia. In all the variants of the experiment, when leaving alfalfa for seeds it produced a 65-70% greater yield after the first mowing than in obtaining the seeds of the second cutting. The best yield (7.7 centners/ha) was obtained with

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USSR/Cultivated Plants - Fodders.

M

Abs Jour : Ref Zhur Biol., No 18, 1958, 82389

Plowing to 18-20 centimeters with t turning the layer, while leaving alfalfa for seeds in the first cutting. Disking two times also produced a high yield of seeds in the first mowing (7.05 centners/ha). On the basis of the obtained data it is recommended to use in the northern regions of Kara-Kalpakiya spring plowing-over without turning the layer, or harrowing and disk the seed plants, three waterings at the rate of 700-800 cubic meters per hectare at the beginning of alfalfa growth, during the budding period and at the beginning of blossoming. The 1st and the 2nd waterings should be carried out after spraying with hexachlorane or with DDT at the rate of 25 kilograms/ha. -- T.I. Karelina

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TUREMURATOV, U.<sup>T.</sup>, Cand Agr Sci -- (diss) "Effect of  
harrowing, disk harrowing, and reploughing <sup>on</sup> the  
~~yield of~~ <sup>seed /</sup> <sup>northern</sup> yield of ~~seminal~~ alfafa in ~~the north of the~~  
Kara-Kalpakiya." Nukus, Karakalpak State Pub House,  
1958, 16 pp. (Uzbek Acad Agr, Tashkent Agr Inst)  
300 copies (KL, 39-58, 111)

- 56 -

TUREMURATOV, U.T.

Seed productivity of alfalfa as dependent on its age in the  
northern Kara-Kalpak regions. Dokl. AN Uz. SSR no.7:51-53  
'57.

(MIRA 11:5)

1. Institut genetiki i fiziologii rasteniy AN UzSSR. Predstavлено  
членом-корреспондентом AN UzSSR S.S. Sadykovym  
(Kara-Kalpak A.S.S.R.--Alfalfa)

TUREMURATOV, Zh.S.

Outlook for the oil and gas potential of the Tenge and Tasbulat  
structures. Vest. AN Kazakh. SSR 20 no.12:68-70 D '64  
(MIRA 18:2)

BAYLAROVA, M.K.; TUREMURATOV, Zh.S.

Geology of the territory in the southeast of the Uzen' deposit  
according to seismic data. Izv. AN Kazakh. SSR. Ser. geol. 21  
no.4:66-68 Jl-Ag '64. (MIRA 17:11)

1. Institut geologicheskikh nauk AN KazSSR imeni Satpayeva, Alma-Ata.

TURENKO, A.I.

Analysis of neurochemical mechanisms of the ascending activation  
of the cerebral cortex in cats during reactions of various  
biological types. Trudy Inst.norm.i pat.fiziol. AMN SSSR 7:100-101  
'64. (MIRA 18:6)

1. Laboratoriya obshchey fiziologii tsentral'noy nervnoy sistemy  
(zav. - deystvitel'nyy chlen AMN SSSR prof. P.K.Anokhin) Instituta  
normal'noy i patologicheskoy fiziologii AMN SSSR.

SUDAKOV, K.V.; TURENKO, A.I.

Neurochemical mechanisms of scending activation of the cerebral cortex in hungry animals. Biul. eksp. biol. i med. 60 no. 10:  
3-8 0 '65 (MIRA 19:1)

1. Laboratoriya obshchey fiziologii tsentral'noy nervnoy sistemy Instituta normal'noy i patologicheskoy fiziologii AMN SSSR (zav. deystvitel'nyy chlen AMN SSSR prof. P.K. Anokhin), Moskva. Submitted June 8, 1964.

L 27288-66 EWT(1) RH/RO

ACC NR: AP6016867

SOURCE CODE: UR/0219/65/060/010/0003/0008 38

AUTHOR: Sudakov, K. V.; Turenko, A. I.

B

ORG: Laboratory of the General Physiology of the Central Nervous System, Institute of Normal and Pathological Physiology/headed by Active member AMN SSSR, Professor P.K. Anokhin/, AMN SSSR, Moscow (Laboratoriya obshchey fiziologii tsentral'noy nervnoy sistemy Instituta normal'noy i patologicheskoy fiziologii AMN SSSR)

TITLE: Neurochemical mechanisms of ascending activation of the cerebral cortex 22  
in starving animals

SOURCE: Byulleten' eksperimental'noy biologii i meditsiny, v. 60, no. 10, 1965, 3-8

TOPIC TAGS: cerebral cortex, cat, EEG, neurophysiology, pharmacology

ABSTRACT: Experiments were carried out to test the validity of the premise that cholinergic systems play an important role in ascending activation of the cerebral cortex under hunger conditions. Cats under urethan anesthesia were used in the experiments. The animals were kept without food for a period of 24 hours. In some of the experiments the electroencephalographic data were obtained directly from the cranium by means of acicular electrodes. In others, trephination of the cranium in the area above the frontal lobe of one of the hemispheres was carried out, making possible the introduction of atropine and amizil, cholinolytic substances, into the cortex. Electroencephalograms directly from the cortex were recorded. UDC: 612.825.1-06:612.391

Card 1/2

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L 27288-66

ACC NR: AP6016867 Potentials in response to the irritation of the sciatic nerve were also recorded. Previous experiments had established that the application of cholinolytic substances to synaptic formations of the cortex inhibited the initial activation of the cortex in starving animals, but had no effect on manifestations of pain activation in response to irritation of the sciatic nerve, indicating a blocking action of the substances on the cholinergic synaptic formations of the cerebral cortex. The cholinolytic substances thus modified the character of the potential induced by the irritation of the sciatic nerve by suppressing all its positive components, and allowing the manifestation of its negative components only. The investigations established also that cortical cholinoreactive synaptic formations participate in the hypothalamic stimulation in hunger conditions; it is logical to assume, the authors note, that cholinolytic substances would produce a similar effect. The results of the experiments thus provide a basis for the premise that the mechanisms of ascending activation of the cortex under hunger conditions are of a neurochemical nature. This paper was presented by Active Member AMN SSSR P.K. Anokhin. Orig. art. has: 3 figures. [JPRS] O

SUB CCDE: 06 / SUBM DATE: 08Jun64 / ORIG REF: 013 / OTH REF: 008

Card

TURENKO, A.N., kand.tekhn.nauk; CHERNEGOV, A.A., inzh.

Improvement of the production technology is a means to cut  
coal costs. Ugol' Ukr. 3 no.9:42-43 S '59. (MIRA 13:2)

1. Kiyevskiy politekhnicheskiy institut (for Turenko).  
2. Baydakovskiy ugol'nyy razrez (for Chernenkov).  
(Coal mines and mining--Costs)

TURENKO, A.N.

DIA  
.R93453

ISSLEDUVANIYE RABOTY ZEMLEROVNYKH  
MASHIN /SURVEY OF THE OPERATION OF EX-  
CAVATING MACHINERY, BY/ A.S. FIDELEV,  
N.Z. GARMACH, I ALEKSANDR SAVEL'YEVICH FIDELEV. KIYEV,  
IZD-VO. AKADEMII NAUK UKRAINSKOY SSR,

1956.

65 P. ILLUS., DIAGRS., TABLES.  
AT HEAD OF TITLE: AKADEMIYA NAUK  
UKRAINSKOY SSR. INSTITUT GOVNOCOGO DELA.

TURENKO, A. N. Cand Tech Sci -- (diss) "Study of the performance of heavy-load  
scrapers in open-pit mining" Kiev, 1957. 11 pp 20 cm (Min of Higher Education  
UkSSR. Kiev Order of Lenin Polytechnic Inst. Chair of Working of Mineral Deposits),  
100 copies. (KL, 24-57, 119)

TURENKO, A.N., kand.tekhn.nauk

Determination of the basic parameters of the operation of wheeled  
scrapers in digging pits. Nauch. zap. Ukrniiproekt no.2:130-132  
'60. (MIRA 1:1)  
(Strip mining) (Excavating machinery)

FIDELEV, Aleksandr Savel'yevich; GARMASH, Nikolay Zakharovich; TURENKO,  
Aleksandr Nikolayevich; KUCHEROV, P.S., otvetstvennyy redaktor;  
ZIL'BAK, M.S., redaktor izdatel'stva; ZHUKOVSKIY, A.D., tekhnicheskiy redaktor

[Research in excavating machinery] Issledovanie raboty zemleroinykh  
mashin. Kiev, Izd-vo Akademii nauk USSR, 1956. 65 p. (MLRA 9:12)

1. Chlen-korrespondent AN USSR (for Kucherov)  
(Excavating machinery)

COUNTRY: USSR

PERIODICAL: Voprosy Biologii Zemli

ARE. JOUR.: Ref Chur-Biologiya, No.1, 1959, No. 1505

AUTHOR: Afonin, A.K.; Turenko, A.P.

INST: --

TITLE: Planning of Shelter-Felt Forestation in the  
Colodny Steppes.

ORIG. PUB.: Leningrad, 1958, No.5, 42-24

ABSTRACT: No abstract

:

CARD: 1/1

CHURIKOV, S. [Churykov, S.], inzh.; TURENKO, I., inzh.

Anticorrosion coatings for reinforced concrete construction  
elements. Bud.mat.i konstr. 1 no.1:24-27 0 '59. (MIRA 13:8)  
(Reinforced concrete--Corrosion)  
(Protective coatings)

TURENKO, Iyan Yakovlevich; CHURIKOV, Semen Stepanovich; CHALOVSKIY, Vlادимир Алексеевич; SLIN'KO, B., red.; BABIL'CHANOVА, G., tekhn. red.

[Preventing the corrosion of concrete reinforcements] Zashchita armatury ot korrozii. Kiev, Gos. izd-vo lit-ry po stroit. i arkhit. USSR, 1961. 18 p. (MIRA 14:9)

1. Akademiya budivnystva i arkhitektury URSS.  
(Concrete reinforcement—Corrosion)

PRIKHODCHENKO, P.P. [Prykhodchenko, P.P.]; TURENKO, I.Ya.; NECHIPORENKO,  
V.G. [Nechiporenko, V.H.], kand. tekhn. nauk

Pneumatic vacuum molding of large sized thin-walled parts from  
epoxy glass reinforced plastics. Khim. prom. no.4:33-35 O-D '64.  
(MIRA 18:3)

TURENKO, M.M.

Experience in the operation of the Lebancvskii Alcohol Plant.  
Spirt. prom. 25 no.4:27-28 '59. (MIRA 12:7)  
(Distilling industry) (Sugar beets)

TURENKO, M.M.; LESIK, A.

Reception, storage, and transportation of molasses. Spirt.prom.  
27 no.2:39-40 '61. (MIRA 14:4)  
(Lobanovo—Molasses)

TUFTEN, I.V.

TRUSH, I.V., inshener; TURMKO, N.A.

Forging rapid-steel cylindrical blanks. Vest.mash. 35 no.10:67-68  
0 '55. (Steel forgings) (Cutting tools)

(MIRA 9:1)

TURENKO, V.I.

Investigating movement of quartz clocks KKhl, KKh2, KKh3. Uch. zap.  
KHGU 86:63-103 '57. (MIRA 12:5)  
(Astronomical clocks)

TURENKO, V.I.

Movements of the quartz clocks of the Kharkov State Institute of  
Measures and Measuring Instruments and irregularity in the earth's  
rotation in 1951-1957. TSir.Astron.obser.Khar.un. no.24:14-24  
'61. (MIRA 15:3)  
(Astronomical clocks) (Earth--Rotation)

40L4B  
S/035/62/000/009/007/060  
A001/A101

9.5400

AUTHOR: Turenko, V. I.

TITLE: The run of the quartz clock of ХГИМIP (KhGIMIP) and non-uniformity of Earth's rotation during 1951 - 1957

PERIODICAL: Referativnyy zhurnal, Astronomiya i Geodeziya, no. 9, 1962, 20, abstract 9A175 ("Tsirkulyar Astron. observ. Khar'kovsk. un-t", 1961, no. 42, 14 - 24)

TEXT: This is a continuation of the investigation of the quartz clock run at KhGIMIP (see RZhAstr, 1959, no. 10, 7865). The run of the quartz clocks KX 1 (KKh1), KKh2, KKh3 and KKh4 up to mid-year of 1957 was investigated. The observed diurnal runs, referred to the middle of every month, are tabulated and presented graphically. The runs of KKh1 and KKh2 are reduced to the constant voltages of the anode and filament, i.e. to their average values in January 1951. On the basis of the runs observed, formulae of "aging" were derived. The rated values of clock runs, determined from these formulae are presented on the same graphs. It follows from them, that during the last year, diurnal run of KKh1, KKh2, KKh3 and KKh4 changed respectively by -0.0016, +0.0038; -0.0004 and -0.0050. A further study is planned to single out from the clock run the fluctuations of astronomical time system in

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S/075/62/000/000/000  
A001/A101

The run of the quartz clock of...

the pure state. The relative clock runs obtained from the comparison by the beat method of oscillators, as well as the average monthly values of temperatures and voltages of the anode and filaments of all oscillators, were made use of for "improvement" of the running clocks. The corrected values of runs of KKhl, KKhl, KKhl, and KKhl' from 1951 to 1957 are also presented in graphs and tables. Differences of readings  $T_{\text{measur.}} - T_{\text{rated}}$  are determined for each clock specimen. On this basis, "average clock" of the epoch 1951-June 1957 was obtained. The curve derived includes corrections for the short-periodic non-uniformity in Earth's rotation. The "residual curve" of readings of the "average clock" for the epoch 1951-June 1957, was obtained by excluding short-periodic non-uniformities. This curve of Earth's non-uniform rotation is presented relative to the beginning of 1951.

M. Ishchenko

[Abstracter's note: Complete translation]

Card 2/2

TUR'ENKO, U.I.

- PHASE I BOOK EXPLOITATION SOV/22/5  
 2N(O); 5(1); 6(2)
- Vsesoyuzny nauchno-issledovatel'skiy institut metrologii imeni D.I. Mendeleyeva  
 Referaty nauchno-issledovatel'skiy rabot i oboznik No. 2 (Scientific Research Abstracts Collection of Articles, Nr 2) Moscow, Standardizatsiya, 1958. 139 p. 1,000 copies printed.
- Additional Sponsoring Agency: USSR. Komitet standartov, ser. 1.  
 Izmeritel'naya priroborov.
- Ed.: S. V. Raskitina; Tech. Ed.: M. A. Kondrat'yeva.
- PURPOSE: These reports are intended for scientists, researchers, and engineers engaged in developing standards, measures, and gauges for the various industries.
- SCOPE: The volume contains 128 reports on standards of measurement and control. The reports were prepared by scientists of the Komitet standartov, merit' i zmeritel'naya priroborov pr. Sovetov M. M. Malisarov SSSR (Commission on Standards, Measures, and Measuring Instruments under the USSR Council of Ministers). The participating institutes are: VNIIM - Vsesoyuzny nauchno-issledovatel'skiy institut fiziko-tehnicheskikh issledovanii (All-Union Scientific Research Institute of Metallurgy and Physical Measurements) in Leningrad; VNIILF - Vsesoyuzny nauchno-issledovatel'skiy institut fiziko-tehnicheskikh issledovanii (All-Union Scientific Research Institute of Physics and Measurement) in Moscow; VNIKIP - Kharkov State Institute of Measures and Measuring Instruments (October 1, 1955); VNIITI - Vsesoyuzny nauchno-issledovatel'skiy institut fiziko-tekhnicheskikh i radioelektronicheskikh i zmeritel'naya priroborov (All-Union Scientific and Radio-engineering Research Institute of Physico-Technical and Radio-engineering Measurements) in Moscow; NIKIMIP - Novosibirsk Institute No. 1 (merit' i zmeritel'naya priroborov) (Kharkov State Institute of Measures and Measuring Instruments); and NIKMIP - Novosibirsk Institute of Measures and Measuring Instruments No. 1 (merit' i zmeritel'naya priroborov) (Novosibirsk State Institute of Measures and Measuring Instruments) (merit' i zmeritel'naya priroborov). No personalities are mentioned. There are no references.
- Rovenchenco, S.S. (VNIIM). Studying Recurrent Errors of Microelectric Screens of Level Trimmers 45
- Solov'yeva, L.A. (VNIIM). Studying the Curvature of the Tube or Level 45
- Bryzgalov, L.D., V.P. Lobentsov, S.M. Okhotin, and P.A. Span'yan (NIKIMIP). Widening the Spectrum of Standard Frequency Produced by the Kholmif Standard Frequency Unit to 10<sup>-5</sup> Cycles per Second 47
- Smashin, A.G. (VNIIM). Quartz Resonator With a Quality Factor of 72.5 ± 10<sup>6</sup> 49
- Osipenko, I.Ye., Ye. D. Nevgorodov, N. Kh. Reparido, T.S. Gavrilova, Yu. M. Libin, and A.I. Samoilovich (NIKIMIP). Developing Quartz Elements of Obligee Cut 49
- Bryzgalov, L.D., N.D. Sapol'skiy, V.N. Titov, P.P. Yestaf'yev, and V.L. Puronto (NIKIMIP). Developing and Studying Simple and Subtuned Oscillators and Convertors of High Stability for Time and Frequency Service. Card 10/27

TURENSCHI, E.; MITITELU, D.; PASCAL, P.; TOMA, M.; ZANOSCHI, V.

New contributions to the flora of Moldavia. Studii biol agr  
Iasi 14 no.2:269-273 '63.

DOBRESCU, C.; MITITELU, D.; TURENSCHI, E.; PASCAL, P.

New contributions to the flora of Rumania. Studii biol agr Lasi  
13 no.1:153-156 '62.

TURENKO, A.N., kand.tekhn.nauk; KURAKOLOV, E.P., gornyy inzh.

Selecting the efficient type of equipment for baring  
open-pit mines. Ugol' Ukr. 6 no.8:20-23 Ag '62. (MIRA 15:11)  
(Strip mining)  
(Coal mining machinery)

TURESHEV, O., Cand Agr Sci -- (diss) "The system of irrigation system  
in the Turkistan cotton sub-zone ~~СССР~~ of the KaSSR."  
Alma-Ata, 1958. 21 pp (Acad Agr Sci KaSSR. Sci Res Inst of  
Agr im V.R. Vil'yams.) 110 copies.  
(KL, 12-58,100)

-66-

... . . .

USSR/Medicine - Hygiene and Sanitation  
Air, Impurities

Aug 50

"Effect of Petroleum Processing Plants on the Quality of the Air," Prof. L. I. Los',  
A. G. Sadovnikova, R. M. Soboleva, D. Ya. Turets, Saratov Oblast Sanitation and  
Hygien Inst

"Gig i San" No 8, pp 8-13

Discusses results of analyses conducted in 1947 and 1948 at various sections of  
petroleum processing plant and perimeter to determine amount of contamination of the  
air. To improve working conditions in nearby living quarters, suggests following  
measures: setting up of equipment to remove sulfur compounds from petroleum, tight  
sealing of equipment used, hermetization of production process, and required distance  
of 2 km between plant and populated sections.

PA 170T69

DAVYDOVA, I.S.; BIRKOVSKIY, Yu.Ye.; KALITSEVA, L.I.; KOLOTILOVA, L.V.;  
TURETSKAYA, E.S.

Diseases caused by S.Breslau. Zhur.mikrobiol. epid. i immun. 32  
no.4:143 Ap '61. (MIRA 14:6)

1. Iz L'vovskogo Instituta epidemiologii, mikrobiologii i gigiyeny.  
(SALMONELLA)

TURETSKAYA, E. S.

USSR/Medicine - Air, Impurities  
Medicine - Hygiene and Sanitation, Industrial

May 1948

"Study of Air During the Slaking of Coke by Phenol Waters of Coal-Tar Chemical Works, II,"  
D. N. Kalyuzhnyy, I. N. Volova, E. S. Turetskaya, Ukrainian SSR Inst of Community Hygiene,  
Kiev, 3½ pp

"Gig i San" Vol XIII, No 5 p. 11-15

When coke was slaked with drainage waters inside of towers, the phenol concentrate for area  
up to 1 km from the towers was considered to be negligible.

PA 70T91

TURETSKAYA, E.S. [Turets'ka, E.S.]

Iodine and bromine concentration in the thyroid gland of white rats  
as related to the vitamin content of food. Ukr. biokhim. zhur. 32  
no.4:578-587 '60. (MIRA 13:9)

1. L'vovskiy institut epidemiologii, mikrobiologii i-gigiyeny.  
(VITAMINS) (IODINE IN THE BODY)  
(BROMINE IN THE BODY) (THYROID GLAND)

TURETSKAYA, E.S., starskiy nauchnyy sotrudnik

Biological role of bromine. Vrach. delo no.7:113-118 Jl'63.  
(MIRA 16:10)

1. L'vovskiy institut epidemiologii, mikrobiologii i giginey.  
(BROMINE IN THE BODY)

SAKHNOVSKAYA, N.N.; TURETSKAYA, E.S.

Sanitary characteristics of the sewage waters of the Rozdol  
sulfur pits. Vrach. delo no.3:114-117 Mr '64. (MIRA 17:4)

1. L'vovskiy institut epidemiologii, mikrobiologii i gigiyeny.

TURETSKAYA, E.S., kand.med.nauk

Mine waters in the Lvov-Volyn coal basin and their influence on the western Bug River. Gig. i san. 26 no.10:73-75 o '61. (MIRA 15:5)

1.Iz L'vovskogo instituta epidemiologii, mikrobiologii i gigiyeny.  
(LVOV-VOLYN BASIN--MINE WATER)  
(WESTERN BUG RIVER--WATER--POLLUTION)

L 18899-63 EWP(j)/EPF(c)/EWT(m)/BDS ASD Pr-4/Pc-4 RM/WW/MAY  
ACCESSION NR: AP3006593 S/0020/63/151/006/1329/1331

AUTHORS: Golubtsov, S. A.; Andrianov, K. A. (Corr. member AN SSSR); Turetskaya, P. A.; Belikova, Z. V.; Trofimova, I. V.; Morozov, N. G. 69

TITLE: Reaction mechanism in the formation of dialkyldichlorosilanes

SOURCE: AN SSSR. Doklady#, v. 151, no. 6, 1963, 1329-1331 7

TOPIC TAGS: dialkyldichlorosilane, dichlorosilane, silane, silicon chloride, copper chloride, hydration, methyl chloride, alkyl chloride

ABSTRACT: Authors showed that during the interaction of alkyl chloride with silica in the presence of copper, dialkyldichlorosilanes are formed. Copper monochloride, which is formed during the reaction of methyl chloride with copper, plays an important part in the synthesis of dialkyldichlorosilanes. The process consists of the adsorption of alkylchloride and its interaction with copper forming CuCl. Copper monochloride reacts with silica forming an intermediate product SiCl<sub>2</sub>. The removal of CuCl from the reaction zone by means of hydration with hydrogen, results in the discontinuation of

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L 18899-63

ACCESSION NR: AP3006593

diethyldichlorosilane formation. Orig. art. has: 1 table, 1 figure  
and 6 formulas.

ASSOCIATION: none

SUBMITTED: 09Apr63 DATE ACQ: 27Sep63 ENCL: 00

SUB CODE: CH NO REF Sov: 005 OTHER: 001

Card 2/2

TURKETIS SAYERS.

Iodine and bromine in the thyroid gland of man. R. S.  
Turets'ka (Inst. Epidemiol. Mikrobiol. i Hyg. I. Vor').  
*Ukrain. Biokhim. Zhur.* 28, 114-18(1959)(Russian summary).—A study was made of 33 thyroid glands removed  
from adults who died of accidents. The object was to det.  
the I and Br content of the thyroid and to det. a correlation  
between the analytical results and local environmental con-  
ditions. The glands were divided into two groups; from  
natives of the L'vovsk region and from newcomers. No  
significant differences were obtained when results were inter-  
preted in terms of I and Br percentages of dry wt. of the  
glands. In terms of abs. I and Br values glands of group 1  
were higher. B. S. Leyins.

Hydrogenation of oxygen containing compounds. IV  
Preparation of  $\alpha$ -xylene. B. I. Moldavskii and L. F. Purietskaya. *J. Gen. Chem. (U.S.S.R.)* 13, 1156 (1940). Phthalic anhydride and phthalide were subjected to hydrogenation in an autoclave at 300-400° and 120 atm. H pressure (initial) with 10% of MnS<sub>2</sub> as catalyst. The best results were obtained when phthalide in 2 vols. tetralin was used; in 5 hr. there was obtained 85%  $\alpha$ -xylene, which, fractionated through a Podbielniak column, b. 142-4°. Phthalic anhydride gave, at best, a 32% yield when run in tetralin as solvent. Elimination of the solvent led to drastic decrease of the  $\alpha$ -xylene yield.  
G. M. Kosolapoff

AB6024019

RM

SCURG CODE: UR/0062/65/000/005/1009/1016

AUTHOR: Golubtsov, S. A.; Korobov, V. V. / (Discussed); Popkov, K. K.; Trofimova, I. V.; Turchikova, R. A.; Andrianov, K. A.; Bolikova, Z. V.; Golosova, R. M.; Ogonblik, N. A.

ORG: none

TITLE: Reactions of formation of alkyl(aryl)chlorosilanes in a direct interaction between alkyl (aryl) chlorides and silicon. Report No. 6. Role of cuprous chloride in the formation of dialkyldichlorosilanes

SOURCE: AN SSSR. Izv. Ser khim, no. 6, 1966, 1009-1016

TOPIC TAGS: silane, chloride, silicon compound, copper compound, CHEMICAL REACTION

ABSTRACT: A mechanism is proposed for the formation of dimethyl(diethyl)dichlorosilane and methyl(ethyl)trichlorosilane during the reaction of methyl (ethyl) chloride with silicon on cuprous chloride. The proposed mechanism for the formation of dialkyl dichlorosilanes is as follows:

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Experimental data UDC: 546.287+542.91+541.124+543.422  
the initial stages of the formation of alkylchlorosilanes formed. The formation of alkylchlorosilanes depends on the conditions of synthesis of alkylchlorides with silicon. The reaction of cuprous chloride with silicon is similar to the reaction of cuprous chloride with alkylchlorides. The proposed mechanism for the formation of dialkyl dichlorosilanes is as follows:

APPROVED FOR RELEASE: 03/14/2001 REF: CIA-RDP86-00513R001757520009-5"

SUB CODE: 07 / SUBM DATE: 12 Feb 04

Card 2/2 dd

L 12869-63  
ACCESSION NR: AP3002939

EWP(j)/EPF(c)/EWT(m)/BDS ASD Pc-4/Pr-4 RM/WW  
S/0076/63/037/006/1377/1381

63

AUTHOR: Kry\*lov, V. D.; Turetskaya, R. A.; Lel'chuk, S. L.

TITLE: Investigation of phase structure of infusible silicon-copper contact masses for direct synthesis of alkylchlorosilanes

SOURCE: Zhurnal fizicheskoy khimii, v. 37, no. 6, 1963, 1377-1381

TOPIC TAGS: alkylchlorosilane, ethyl chloride, ethylchlorosilane, silica

ABSTRACT: It has been shown in a previous article that silica and the intermetallic compound Cu sub 3 Si = Cu sub 3, Si (N-phase) = Eta phase enters into the reaction as a contact mass in the direct synthesis of alkylchlorosilane of copper silicate fusion. The phase structure undergoes several changes during its interaction with ethyl chloride. At the beginning of the synthesis, the silica from the intermetallic compound enters into the reaction, liberating the elemental copper. The rate of formation of the ethylchlorosilanes increases analogously with the decrease of Eta N-phase concentration and the increase of concentration of free copper in the contact mass. This points to the fact that the formation of ethyl-chlorosilanes is possible in the presence of Eta N-phase silica, and also through the reaction of ethylchloride with the free silica under a catalytic

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L 12869-63

ACCESSION NR: AP3002939

action of elemental copper. Based on the above information, an X-ray investigation was made of the phase structures of nonfusible contact masses which are used in the direct synthesis of alkylchlorosilanes. The intermetallic compound Cu sub 3 Si is formed at temperatures 300 to 400C from silica and copper at the moment of separation of alkylchlorosilanes. The chlorosilanes decrease the temperature at which Cu sub 3 Si is formed. During the synthesis of alkylchlorosilanes Cu sub 3 Si and highly dispersed catalytically active copper is constantly formed. The silica entering into the composition of Cu sub 3 Si possesses a varied reactivity depending on the method of preparation of the contact mass. Orig. art. has: 6 figures.

ASSOCIATION: None

SUBMITTED: 05Jun62 DATE ACQ: 16Jul63 ENCL: 00

SUB CODE: 00 NO REF SOV: 006 OTHER: 002

Card 2/2